



Part Number: 3084F

DeviceNet™, (1 pr) 22 AWG (155x44) TC, (1 pr) 24 AWG (105x44) TC, PVC-FPE/PVC, Foil+TC Braid Shld, CMG

Product Description

One 22 AWG stranded (155x44) tinned copper conductors, one 24 AWG stranded (105x44) tinned copper conductors, PVC insulation (power), foam polyethylene (FPE) insulation (data), individual foil shield (100% coverage) plus an overall tinned copper braid (65% coverage), PVC jacket.

Technical Specifications

Construction and Dimensions

Conductor:

AWG	Stranding	Material	No. of Conductors	No. of Pairs
22	155x44	TC - Tinned Copper	4	1
24	105x44	TC - Tinned Copper		1

Insulation:

Element	Material
22	PVC - Polyvinyl Chloride
24	FPE - Foam Polyethylene

Color Chart 1:

Number	Color
22 AWG Pair	Red & Black
24 AWG Pair	Blue & White

Stranding:

Lay Length
1 MHz

Innershield:

Type	Layer	Material	Material Trade Name	Coverage [%]	Drainwire AWG	Drainwire Construction n x D
Tape	22 AWG Pair	Aluminum Foil-Polyester Tape	Beldfoil®	100 %	22	26x36 mm
Tape	24 AWG Pair	Aluminum Foil-Polyester Tape	Beldfoil®	100 %	TC - Tinned Copper	

Outershield 1:

Type	Material	Coverage [%]
Braid	TC - Tinned Copper	65 %

Outerjacket 1:

Material	Nominal Diameter
PVC - Polyvinyl Chloride	0.275 in

Electrical Characteristics

Conductor DCR:

Element	Max. Conductor DCR	Nominal Outer Shield DCR
22 AWG	17.5 Ohm/1000ft	3.2 Ohm/1000ft
24 AWG	28 Ohm/100m	

Capacitance:

Element	Nom. Capacitance Conductor to Conductor
24 AWG Pair	12 pF/ft

Impedance:

Nominal Characteristic Impedance	Nominal Characteristic Impedance Description
120 Ohm	24 AWG Pair

Delay:

Max. Delay	Max. Delay Description	Nominal Velocity of Propagation (VP) [%]	Nominal Velocity of Propagation (VP) Description
1.36 ns/ft	24 AWG Pair	75 %	24 AWG Pair

High Freq:

Element	Frequency [MHz]
24 AWG Pair Only	0.125 MHz
	0.5 MHz
	1 MHz

Current:

Max. Recommended Current [A]
1.7 Amps per conductor @ 25°C (24 AWG)
4 Amps per conductor @ 24 V per NEC CL2 (Power Pair)

Voltage:

UL Description	UL Voltage Rating
CL2, CMG	300 V RMS
C(UL) AWM	300 V RMS

Use

Suitability - Oil Resistance:	Yes
Suitability - Sunlight Resistance:	Yes
Max Recommended Pulling Tension:	65 lbs

Safety

CSA Flammability:	FT4
UL Flammability:	UL1685 FT4 Loading

Temperature Range

Operating Temp Range:	-20°C To +75°C
UL Temp Rating:	75°C

Mechanical Characteristics

Min Bend Radius/Minor Axis:	2.75 in
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Part Number

Plenum (Y/N):	No
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Standards

CA Prop 65 (CJ for Wire & Cable):	CA Prop 65 (CJ for Wire & Cable)
CEC/C(UL) Specification:	CEC/C(UL) Specification

MII Order #39 (China RoHS):	MII Order #39 (China RoHS)
Other Specification:	Other Specification
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)
EU CE Mark:	EU CE Mark

History

Notes:	Hi-Flex. Thin. Flex Test Results: "S-Bend" Flex Test - 4" Diameter Wheels, 2 lbs. tension: 150,000 Cycles Averaged. +/-90 Degree Flex Test: 2" Diameter, 2 lbs. tension - 8500 Cycles Averaged. Flex tests were conducted at less than the recommended cable minimum bend radius. Actual cable performance will depend on the individual application. Meter marks on jacket to aid users in installation.
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Product Variants

Part Number	Color	Put-Up Type	Length
3084F T5U1000	GRAY T5U	Reel	1000 ft
3084F T5U2000	GRAY T5U	Reel	2000 ft
3084F T5U5000	GRAY T5U	Reel	5000 ft
3084F T5U500	GRAY T5U	Reel	500 ft

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